## <u>ABSTRACT</u>

This invention relates to a new class of polyene polyketides, their pharmaceutically acceptable salts and derivatives, and to methods for obtaining the compounds. One method of obtaining these compounds is by cultivation of novel strains of *Streptomyces aizunensis*; another method involves expression of biosynthetic pathway genes in transformed host cells. The present invention further relates to the novel strains of *Streptomyces aizunensis* used to produce these compounds, to the use of these compounds and their pharmaceutically acceptable salts and derivatives as pharmaceuticals, in particular to their use as inhibitors of fungal cell growth and cancer cell growth. The invention also relates to pharmaceutically acceptable salts or derivatives thereof. Finally, the invention relates to novel polynucleotide sequences and their encoded proteins, which are involved in the biosynthesis of these novel polyketides.